



Docket No.: 511582003500  
(PATENT)

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

In re Patent Application of:

Mary FARIS, et al.

Application No.: 09/809,638

Filed: March 14, 2001

For: 125P5C8: A TISSUE SPECIFIC PROTEIN  
HIGHLY EXPRESSED IN VARIOUS  
CANCERS

Art Unit: 1643

Examiner: A. Harris

**DECLARATION BY INVENTORS**  
**UNDER 37 C.F.R. § 1.131**

MS Amendment  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Dear Sir:

We, the undersigned, declare as follows:

1. We are co-inventors of claims 1, 14 and 23, currently pending in the above-referenced application. The claims relate to an isolated 125P5C8 protein comprising the sequence of SEQ ID NO: 2 or a polynucleotide sequence encoding the codons for SEQ ID NO: 2, which is exemplified by the nucleotide sequence of SEQ ID NO:1.

2. The Office rejected claims 1, 14 and 23 as allegedly being anticipated by WO 200270539 A2, which was filed March 5, 2002. This PCT application claims priority to U.S. Application No. 09/799,451, which was filed March 5, 2001, and is now U.S. Patent No. 6,783,989.

A copy of WO 200270539 was submitted in an Information Disclosure Statement provided in this application mailed on April 5, 2001. This document discloses sequence 1397 which is identical to SEQ ID NO: 2 of the present application.

3. We reduced the claimed invention to practice in the United States prior to the date U.S. Patent No. 6,783,989 was filed (March 5, 2001).

4. This reduction to practice is evidenced by a true and accurate copy of an email message sent to various members of the scientific staff by inventor Steve C. Mitchell on January 3, 2001. The email provides the nucleic acid and amino acid sequences of the material encompassed by the claims in the above-referenced patent application. A copy of this email is provided as Exhibit A.

5. The nucleotide sequence disclosed in Exhibit A consists of 2,103 nucleotides and 699 amino acids.

6. Exhibit B shows a comparison of the nucleotide sequence of SEQ ID NO:1 and the nucleotide sequence disclosed in Exhibit A. Every single nucleotide disclosed in SEQ ID NO:1 is present in the nucleotide sequence disclosed in Exhibit A. Accordingly, the email of Exhibit A clearly demonstrates the that nucleotide sequence of SEQ ID NO:1 was in our possession prior to the earliest priority date to which WO 200270539 (the cited art) is entitled to claim.

7. Exhibit C shows a comparison of the amino acid sequence of SEQ ID NO:2 and the amino acid sequence disclosed in Exhibit A. Every single amino acid residue disclosed in SEQ ID NO: 2 is present in the amino acid sequence disclosed in Exhibit A. Accordingly, the email of Exhibit A clearly demonstrates the that amino acid sequence of SEQ ID NO:2 was in our possession prior to the earliest priority date to which WO 200270539 (the cited art) is entitled to claim.

8. In view of the email provided as Exhibit A and the analysis of the sequences disclosed therein and shown in Exhibits B and C, we declare that the invention of the pending claims was reduced to practice in the United States prior to March 5, 2001, the earliest priority date available to the cited document.

We declare that all statements made herein of our own knowledge are true and that all statements made on information and belief are believed to be true; and further, that these statements are made with the knowledge that willful, false statements and the like so made are punishable by fine or imprisonment or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Date

Executed at

01/26/2006      Santa Monica, CA      Aya Jakobovits  
(City/State)      Aya JAKOBOVITS

\_\_\_\_\_  
(City/State)      Daniel E.H. AFAR

\_\_\_\_\_  
(City/State)      Steve Chappell MITCHELL

1/27/06      Santa Monica, CA      Pia M. Challita-Eid  
(City/State)      Pia M. CHALLITA-EID

1-27-06      Santa Monica CA      Arthur B. Raitano  
(City/State)      Arthur B. RAITANO

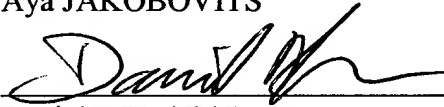
\_\_\_\_\_  
(City/State)      Mary FARIS

8. In view of the email provided as Exhibit A and the analysis of the sequences disclosed therein and shown in Exhibits B and C, we declare that the invention of the pending claims was reduced to practice in the United States prior to March 5, 2001, the earliest priority date available to the cited document.

We declare that all statements made herein of our own knowledge are true and that all statements made on information and belief are believed to be true; and further, that these statements are made with the knowledge that willful, false statements and the like so made are punishable by fine or imprisonment or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the application or any patent issued thereon.

Date

Executed at

|                             |  |  |
|-----------------------------|--|--|
| <u>2/1/2006</u>             | <u>(City/State)</u><br><u>FREMONT, CA</u><br><u>(City/State)</u> | <u>Aya JAKOBOVITS</u><br><br><u>Daniel E.H. AFAR</u> |
| <u>                    </u> | <u>(City/State)</u>  | <u>Steve Chappell MITCHELL</u>   |
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| <u>                    </u> | <u>(City/State)</u>  | <u>Arthur B. RAITANO</u>   |
| <u>                    </u> | <u>(City/State)</u>  | <u>Mary FARIS</u>  |

**Popp, Shane**

From: Mitchell, Steve  
Sent: Wednesday, January 03, 2001 1:43 PM  
To: Scientists  
Subject: 125P5C8 reagents.

Colleagues,

The Company reagent for 125P5C8 (124P1B7/139P3A1) is posted. It is a PCR based pCR2.1/TA clone(prostate) with three point differences from the Japanese (colon) reported hypothetical sequence.  
Two point are conserved for translation whereas the third point difference gives an amino acid change near the 3 prime end. This is verified with genomic sequencing.

>125P5C8(124P1B7/139P3A1) pCR2.1 subclone

```
CGATGACCTCGCTGTGGAGAGAAATCCTCTTGGAGTCGCTGCTGGGATGTGTTTCTTGGTCTCTCTACCATGACCTGGGACCGATG
ATCTATTACTTTCTTTGCAAACTAGAACTCACTGGGCTTGAAGGTTTGTAGTATAGCATTTCTTTCTCCAATATTCCTAACAATTACT
CCTTTCTGGAAATGGTTAACAAGAGTGGATGCTAACCCCTGCTGAGGATAATCACTATTGGCAGCATAGCCTCCTTCCAGGCTCCA
AATGCCAAACTTCGACTGATGTTCTTGGCGCTTGGGGTGTCTTCTCACTGATAGTGCAAGCTGTGACTTGGTGGTCCGGGAAGTCAT
TTGCAAGGTACCTCAGAAATTTGGGGATTCATTTAGGACAGATTGTTCTTGTGTTCTACGCATATGGTATATTCACTAAACCCAAAT
CTGGAGTTATCAGATGTCCAACAAAGTGATACTGACATTAAGTGCCATAGCCACACTTGATCGTATTGGCACAGATGGTGACTGCAG
TAAACCTGAAGAAAAGAGACTGGTGAGGTAGCCACGGGGATGGCCTCTAGACCCAACTGGCTGCTGGCAGGGGCTGCTTTTGGT
AGCCTTGTGTTCTCACTGGGTTTGGAGAAGTCTCTTGTTCAGATGGGCAGTGAGTGGGCATCCACATCCAGGGGCC
AGATCCTAACCCATTGGAGGTGCAGTACTGCTGTGCTTGGCAAGTGGATTGATGCTTCCATCTTGTGTTGGTTTCGTGGTACTGG
TTTGATCTGGTGGTTACAGGAACAGCTTCAGCTGCGGGGCTCCTTTACCTGCACACATGGGCAAGCTGCTGTGCTGGCTGTGCT
TCGCCATCTTTACTGCATCCATGTGGCCCCAAACACTTGGACACCTTATTAACCTCAGGGACAAACCCCTGGGAAAACCATGACCATTG
CCATGATATTTATCTCTAGAAATATTTTCTGTGCTGGTGGTGACAGCTTTTAAAGTTTGTCCAGGAGGTGTCTACGCTAGAGAAAG
ATCAGATGTGCTTTGGGGACAATGATGTTAATTATCGGGCTGAATATGCTATTTGGTCTAAGAAAAACCTTGACTTGGCTTCTTCAA
ACAAAAACAGTTCTAAAGTGCTTTTCAGAAAGAGTGAAAAATACATGAACTTTTCTGTGGCTGCTTGTGGTGTGGGATTGTGG
GATTAGGACTACGGCATAAAGCCTATGAGAGAAAACCTGGGCAAGTGCCACCAACCAAGAGGTCTCTGCTGCCATCTGGCCTTTC
AGGTTTGGATATGACAATGAAGGGTGGTCTAGTCTAGAAAGATCAGCTCACCTGCTCAATGAAACAGGTGCAGATTTCAATAAAT
TTGGAGAGTGATGCTTCTAAGCCCTATATGGGGAACAATGACTTAACCATGTGGCTAGGGGAAAAGTTGGGTTTCTATACAGACTTT
GGTCCAAGCACAAGGTATCACACTTGGGGGATTATGGCTTTGTCAAGATACCAATTGTGAAATCTGAGCATCACCTTCTTCCGTCA
CCAGAGGGGCGAGATCGCACAGCCATCACATTGACCGTTAACATTTGGGGCAAGCTGGTGGATTTTGTGCTGACACACTTTGGGAA
CCACGAAGTGACCTCGACAGGAACTGCAGGCTATTGCTGTTTCAAACTACTGAAAAGTAGCTCTAATCAAGTGATATTTCTGGG
ATATATCACTTCAAGCACTGGCTCCAGAGATTATCTACAGCTCACTGAACATGGCAATGTGAAGGATATCGACAGCACTGATCATGA
CAGATGGTGTGAATACATTATGTATCGAGGGCTGATCAGGTGGGTTATGCAAGAATCTCCCATGCTGAAGTGAAGTATCAGAAAT
TCAGATGGCAAAATTAGGATCCCTGATGACCCCACTAATTATAGAGACAACCAGAAAGTGGTCATAGACCACAGAGAAGTTTCTGA
GAAAATTCAATTTATCCAGATTGGATCCTACAAAGAAGGACACAATTATGAAAACAACCATCATTTTCATATGAATACTCCAAAT
ACTTTTATGAAAC
```

>125P5C8(124P1B7/139P3A1) pCR2.1 subclone

```
VTSLWREILLESLLGCYSWSLYHDLGPMIYYFPLQLELTGLEGFSIAFLSPIFLTTPFWKLWNKKWMLTLRLITIGSIASFOAPNAKLRLM
/LALGVSSSLIVQAVTWVSGSHLQRYLRWVGFILGOVLVLRWYTSLNPIWVSYQMSNKKVILTLAJATLDRIGTDGDCSKPEEKKTGEVA
/GMASRPNWLLAGAAFGSLVFLTHWVFGVSLVSRWAVSGHPHPGDPNPFGGAVLLCLASGLMLPSCSLWFRGTGLWVWVTGTASAA
/LLYLHTWAAVSGCVFAIFTASMWPTLGHUNSGTNPGKMTMTAMIFYLLEIFFCAWCTAFKFVPGGVYARERSDVLLGTMMLIIGLNML
/GPKKNLDLLQTKNSSKVLFRKSEKYMKFLWLLVGVGLLGLGLRHKAYERKLGKVPATKEVSAIWPFRFGYDNEGWSLSERSAHL
/IETGADFITILESASKPYMGNNDLTMWLGEKLGFTDFGPTSTRYHTWGIMALSRYPIVSEHLLPSPEGEIAPATLTWNISGKLVDFFV
/HFGNHEDDLDRKLQAIKLVSKLSSSNQVFLGYITSAPGSRDYQLTEHGNVKDIDSTDHHRWCEYIMYRGLRLGYARISHAELSDSEI
/IMAKFRIPDDPTNYRDNQKVVIDHREVSEKIHFNPRFGSYKEGHYENNIHIFHMNTPKYFL
```

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**Exhibit B****A Comparison of SEQ ID NO.:1 and the Nucleotide Sequence of the Email**

|               |            |            |            |            |            |       |
|---------------|------------|------------|------------|------------|------------|-------|
| atgacctcgc    | tgtggagaga | aatcctcttg | gagtcgctgc | tgggatgtgt | ttcttggtct | SID#1 |
|               |            |            |            |            |            |       |
| cg atgacctcgc | tgtggagaga | aatcctcttg | gagtcgctgc | tgggatgtgt | ttcttggtct | Email |

|            |            |            |            |          |            |       |
|------------|------------|------------|------------|----------|------------|-------|
| ctctaccatg | acctgggacc | gatgatctat | tactttcctt | tgcaaact | agaactcact | SID#1 |
|            |            |            |            |          |            |       |
| ctctaccatg | acctgggacc | gatgatctat | tactttcctt | tgcaaact | agaactcact | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| gggcttgaag | gttttagtat | agcatttctt | tctccaatat | tcctaacaat | tactcctttc | SID#1 |
|            |            |            |            |            |            |       |
| gggcttgaag | gttttagtat | agcatttctt | tctccaatat | tcctaacaat | tactcctttc | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| tggaaattgg | ttaacaagaa | gtggatgcta | accctgctga | ggataatcac | tattggcagc | SID#1 |
|            |            |            |            |            |            |       |
| tggaaattgg | ttaacaagaa | gtggatgcta | accctgctga | ggataatcac | tattggcagc | Email |

|            |            |            |            |            |             |       |
|------------|------------|------------|------------|------------|-------------|-------|
| atagcctcct | tccaggctcc | aaatgccaaa | cttcgactga | tggttcttgc | gcttgggggtg | SID#1 |
|            |            |            |            |            |             |       |
| atagcctcct | tccaggctcc | aaatgccaaa | cttcgactga | tggttcttgc | gcttgggggtg | Email |

|            |           |            |            |            |            |       |
|------------|-----------|------------|------------|------------|------------|-------|
| tcttcctcac | tgatagtgc | agctgtgact | tggtggtcgg | gaagtcattt | gcaaaggtac | SID#1 |
|            |           |            |            |            |            |       |
| tcttcctcac | tgatagtgc | agctgtgact | tggtggtcgg | gaagtcattt | gcaaaggtac | Email |

|            |            |            |            |            |             |       |
|------------|------------|------------|------------|------------|-------------|-------|
| ctcagaattt | ggggattcat | tttaggacag | attgttcttg | ttgttctacg | catatgggtat | SID#1 |
|            |            |            |            |            |             |       |
| ctcagaattt | ggggattcat | tttaggacag | attgttcttg | ttgttctacg | catatgggtat | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| acttcactaa | acccaatctg | gagttatcag | atgtccaaca | aagtgatact | gacattaagt | SID#1 |
|            |            |            |            |            |            |       |
| acttcactaa | acccaatctg | gagttatcag | atgtccaaca | aagtgatact | gacattaagt | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| gccatagcca | cacttgatcg | tattggcaca | gatggtgact | gcagtaaacc | tgaagaaaag | SID#1 |
|            |            |            |            |            |            |       |
| gccatagcca | cacttgatcg | tattggcaca | gatggtgact | gcagtaaacc | tgaagaaaag | Email |

|             |            |            |           |            |            |       |
|-------------|------------|------------|-----------|------------|------------|-------|
| aagactgggtg | aggtagccac | ggggatggcc | tctagacca | actggctgct | ggcaggggct | SID#1 |
|             |            |            |           |            |            |       |
| aagactgggtg | aggtagccac | ggggatggcc | tctagacca | actggctgct | ggcaggggct | Email |

|            |            |           |            |            |             |       |
|------------|------------|-----------|------------|------------|-------------|-------|
| gcttttggtg | gccttggtgt | cctcaccac | tgggtttttg | gagaagtctc | tcttggtttcc | SID#1 |
|            |            |           |            |            |             |       |
| gcttttggtg | gccttggtgt | cctcaccac | tgggtttttg | gagaagtctc | tcttggtttcc | Email |

**Exhibit B**  
**A Comparison of SEQ ID NO.:1 and the Nucleotide Sequence of the Email**

|            |            |            |            |           |            |       |
|------------|------------|------------|------------|-----------|------------|-------|
| agatgggcag | tgagtgggca | tccacatcca | gggccagatc | ctaaccatt | tggaggtgca | SID#1 |
|            |            |            |            |           |            |       |
| agatgggcag | tgagtgggca | tccacatcca | gggccagatc | ctaaccatt | tggaggtgca | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| gtactgctgt | gcttggcaag | tggattgatg | cttccatctt | gtttgtggtt | tcgtggtact | SID#1 |
|            |            |            |            |            |            |       |
| gtactgctgt | gcttggcaag | tggattgatg | cttccatctt | gtttgtggtt | tcgtggtact | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| ggtttgatct | ggtgggttac | aggaacagct | tcagctgcgg | ggctccttta | cctgcacaca | SID#1 |
|            |            |            |            |            |            |       |
| ggtttgatct | ggtgggttac | aggaacagct | tcagctgcgg | ggctccttta | cctgcacaca | Email |

|            |            |            |            |            |           |       |
|------------|------------|------------|------------|------------|-----------|-------|
| tgggcagctg | ctgtgtctgg | ctgtgtcttc | gccatcttta | ctgcatccat | gtggcccaa | SID#1 |
|            |            |            |            |            |           |       |
| tgggcagctg | ctgtgtctgg | ctgtgtcttc | gccatcttta | ctgcatccat | gtggcccaa | Email |

|           |            |          |            |            |            |       |
|-----------|------------|----------|------------|------------|------------|-------|
| acacttgga | accttattaa | ctcaggga | aaccctggga | aaaccatgac | cattgccatg | SID#1 |
|           |            |          |            |            |            |       |
| acacttgga | accttattaa | ctcaggga | aaccctggga | aaaccatgac | cattgccatg | Email |

|            |            |            |             |            |            |       |
|------------|------------|------------|-------------|------------|------------|-------|
| atatattatc | ttctagaaat | atatttctgt | gcctgggtgca | cagcttttaa | gtttgtccca | SID#1 |
|            |            |            |             |            |            |       |
| atatattatc | ttctagaaat | atatttctgt | gcctgggtgca | cagcttttaa | gtttgtccca | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| ggaggtgtct | acgctagaga | aagatcagat | gtgcttttgg | ggacaatgat | gttaattatc | SID#1 |
|            |            |            |            |            |            |       |
| ggaggtgtct | acgctagaga | aagatcagat | gtgcttttgg | ggacaatgat | gttaattatc | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| gggctgaata | tgctatttgg | tcctaagaaa | aaccttgact | tgcttcttca | aacaaaaaac | SID#1 |
|            |            |            |            |            |            |       |
| gggctgaata | tgctatttgg | tcctaagaaa | aaccttgact | tgcttcttca | aacaaaaaac | Email |

|            |            |           |            |            |            |       |
|------------|------------|-----------|------------|------------|------------|-------|
| agttctaaag | tgcttttcag | aaagagtga | aaatacatga | aactttttct | gtggctgctt | SID#1 |
|            |            |           |            |            |            |       |
| agttctaaag | tgcttttcag | aaagagtga | aaatacatga | aactttttct | gtggctgctt | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| gttggtgtgg | gattgttggg | attaggacta | cggcataaag | cctatgagag | aaaactgggc | SID#1 |
|            |            |            |            |            |            |       |
| gttggtgtgg | gattgttggg | attaggacta | cggcataaag | cctatgagag | aaaactgggc |       |

**Exhibit B****A Comparison of SEQ ID NO.:1 and the Nucleotide Sequence of the Email**

|             |             |             |            |            |            |       |
|-------------|-------------|-------------|------------|------------|------------|-------|
| aaagtggcac  | caaccaaaga  | ggctctctgct | gccatctggc | ctttcagggt | tggatatgac | SID#1 |
|             |             |             |            |            |            |       |
| aaagtggcac  | caaccaaaga  | ggctctctgct | gccatctggc | ctttcagggt | tggatatgac | Email |
|             |             |             |            |            |            |       |
| aatgaagggt  | ggctctagtct | agaaagatca  | gctcacctgc | tcaatgaaac | aggtgcagat | SID#1 |
|             |             |             |            |            |            |       |
| aatgaagggt  | ggctctagtct | agaaagatca  | gctcacctgc | tcaatgaaac | aggtgcagat | Email |
|             |             |             |            |            |            |       |
| ttcataacaa  | ttttggagag  | tgatgcttct  | aagccctata | tggggaacaa | tgacttaacc | SID#1 |
|             |             |             |            |            |            |       |
| ttcataacaa  | ttttggagag  | tgatgcttct  | aagccctata | tggggaacaa | tgacttaacc | Email |
|             |             |             |            |            |            |       |
| atgtggctag  | gggaaaagtt  | gggtttctat  | acagactttg | gtccaagcac | aaggtatcac | SID#1 |
|             |             |             |            |            |            |       |
| atgtggctag  | gggaaaagtt  | gggtttctat  | acagactttg | gtccaagcac | aaggtatcac | Email |
|             |             |             |            |            |            |       |
| acttggggga  | ttatggcttt  | gtcaagatac  | ccaattgtga | aatctgagca | tcaccttctt | SID#1 |
|             |             |             |            |            |            |       |
| acttggggga  | ttatggcttt  | gtcaagatac  | ccaattgtga | aatctgagca | tcaccttctt | Email |
|             |             |             |            |            |            |       |
| ccgtcaccag  | agggcgagat  | cgcaccagcc  | atcacattga | ccgttaacat | ttcgggcaag | SID#1 |
|             |             |             |            |            |            |       |
| ccgtcaccag  | agggcgagat  | cgcaccagcc  | atcacattga | ccgttaacat | ttcgggcaag | Email |
|             |             |             |            |            |            |       |
| ctgggtggatt | ttgtcgtgac  | acactttggg  | aaccacgaag | atgacctcga | caggaaactg | SID#1 |
|             |             |             |            |            |            |       |
| ctgggtggatt | ttgtcgtgac  | acactttggg  | aaccacgaag | atgacctcga | caggaaactg | Email |
|             |             |             |            |            |            |       |
| caggctattg  | ctgtttcaaa  | actactgaaa  | agtagctcta | atcaagtgat | atttctggga | SID#1 |
|             |             |             |            |            |            |       |
| caggctattg  | ctgtttcaaa  | actactgaaa  | agtagctcta | atcaagtgat | atttctggga | Email |
|             |             |             |            |            |            |       |
| tatatcactt  | cagcacctgg  | ctccagagat  | tatctacagc | tcactgaaca | tggcaatgtg | SID#1 |
|             |             |             |            |            |            |       |
| tatatcactt  | cagcacctgg  | ctccagagat  | tatctacagc | tcactgaaca | tggcaatgtg | Email |
|             |             |             |            |            |            |       |
| aaggatatcg  | acagcactga  | tcatgacaga  | tgggtgtaat | acattatgta | tcgagggctg | SID#1 |
|             |             |             |            |            |            |       |
| aaggatatcg  | acagcactga  | tcatgacaga  | tgggtgtaat | acattatgta | tcgagggctg | Email |
|             |             |             |            |            |            |       |
| atcaggttgg  | gttatgcaag  | aatctcccat  | gctgaactga | gtgattcaga | aattcagatg | SID#1 |
|             |             |             |            |            |            |       |
| atcaggttgg  | gttatgcaag  | aatctcccat  | gctgaactga | gtgattcaga | aattcagatg |       |



**Exhibit B****A Comparison of SEQ ID NO.:1 and the Nucleotide Sequence of the Email**

|            |            |           |            |            |            |       |
|------------|------------|-----------|------------|------------|------------|-------|
| gcaaaattta | ggatccctga | tgacccact | aattatagag | acaaccagaa | agtggtcata | SID#1 |
|            |            |           |            |            |            |       |
| gcaaaattta | ggatccctga | tgacccact | aattatagag | acaaccagaa | agtggtcata | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| gaccacagag | aagtttctga | gaaaattcat | tttaatccca | gatttggatc | ctacaaagaa | SID#1 |
|            |            |            |            |            |            |       |
| gaccacagag | aagtttctga | gaaaattcat | tttaatccca | gatttggatc | ctacaaagaa | Email |

|            |            |            |            |            |            |       |
|------------|------------|------------|------------|------------|------------|-------|
| ggacacaatt | atgaaaacaa | ccatcatttt | catatgaata | ctcccaaata | ctttttatga | SID#1 |
|            |            |            |            |            |            |       |
| ggacacaatt | atgaaaacaa | ccatcatttt | catatgaata | ctcccaaata | ctttttatga | Email |

|     |       |
|-----|-------|
| aac | SID#1 |
|     |       |
| aac | Email |

**Exhibit C****A Comparison of SEQ ID NO.:2 and the Nucleotide Sequence of the Email**

Met Thr Ser Leu Trp Arg Glu Ile Leu Leu Glu Ser Leu Leu Gly (SID #2)  
 | | | | | | | | | | | | | |  
 Met Thr Ser Leu Trp Arg Glu Ile Leu Leu Glu Ser Leu Leu Gly (Email)

Cys Val Ser Trp Ser Leu Tyr His Asp Leu Gly Pro Met Ile Tyr Tyr (SID #2)  
 | | | | | | | | | | | | | |  
 Cys Val Ser Trp Ser Leu Tyr His Asp Leu Gly Pro Met Ile Tyr Tyr (Email)

Phe Pro Leu Gln Thr Leu Glu Leu Thr Gly Leu Glu Gly Phe Ser Ile (SID #2)  
 | | | | | | | | | | | | | |  
 Phe Pro Leu Gln Thr Leu Glu Leu Thr Gly Leu Glu Gly Phe Ser Ile (Email)

Ala Phe Leu Ser Pro Ile Phe Leu Thr Ile Thr Pro Phe Trp Lys Leu (SID #2)  
 | | | | | | | | | | | | | |  
 Ala Phe Leu Ser Pro Ile Phe Leu Thr Ile Thr Pro Phe Trp Lys Leu (Email)

Val Asn Lys Lys Trp Met Leu Thr Leu Leu Arg Ile Ile Thr Ile Gly (SID #2)  
 | | | | | | | | | | | | | |  
 Val Asn Lys Lys Trp Met Leu Thr Leu Leu Arg Ile Ile Thr Ile Gly (Email)

Ser Ile Ala Ser Phe Gln Ala Pro Asn Ala Lys Leu Arg Leu Met Val (SID #2)  
 | | | | | | | | | | | | | |  
 Ser Ile Ala Ser Phe Gln Ala Pro Asn Ala Lys Leu Arg Leu Met Val (Email)

Leu Ala Leu Gly Val Ser Ser Ser Leu Ile Val Gln Ala Val Thr Trp (SID #2)  
 | | | | | | | | | | | | | |  
 Leu Ala Leu Gly Val Ser Ser Ser Leu Ile Val Gln Ala Val Thr Trp (Email)

Trp Ser Gly Ser His Leu Gln Arg Tyr Leu Arg Ile Trp Gly Phe Ile (SID #2)  
 | | | | | | | | | | | | | |  
 Trp Ser Gly Ser His Leu Gln Arg Tyr Leu Arg Ile Trp Gly Phe Ile (Email)

Leu Gly Gln Ile Val Leu Val Val Leu Arg Ile Trp Tyr Thr Ser Leu (SID #2)  
 | | | | | | | | | | | | | |  
 Leu Gly Gln Ile Val Leu Val Val Leu Arg Ile Trp Tyr Thr Ser Leu (Email)

Asn Pro Ile Trp Ser Tyr Gln Met Ser Asn Lys Val Ile Leu Thr Leu (SID #2)  
 | | | | | | | | | | | | | |  
 Asn Pro Ile Trp Ser Tyr Gln Met Ser Asn Lys Val Ile Leu Thr Leu (Email)

Ser Ala Ile Ala Thr Leu Asp Arg Ile Gly Thr Asp Gly Asp Cys Ser (SID #2)  
 | | | | | | | | | | | | | |  
 Ser Ala Ile Ala Thr Leu Asp Arg Ile Gly Thr Asp Gly Asp Cys Ser (Email)

**Exhibit C****A Comparison of SEQ ID NO.:2 and the Nucleotide Sequence of the Email**

Lys Pro Glu Glu Lys Lys Thr Gly Glu Val Ala Thr Gly Met Ala Ser (SID #2)  
 | | | | | | | | | | | | | | | |  
 Lys Pro Glu Glu Lys Lys Thr Gly Glu Val Ala Thr Gly Met Ala Ser (Email)

Arg Pro Asn Trp Leu Leu Ala Gly Ala Ala Phe Gly Ser Leu Val Phe (SID #2)  
 | | | | | | | | | | | | | | | |  
 Arg Pro Asn Trp Leu Leu Ala Gly Ala Ala Phe Gly Ser Leu Val Phe (Email)

Leu Thr His Trp Val Phe Gly Glu Val Ser Leu Val Ser Arg Trp Ala (SID #2)  
 | | | | | | | | | | | | | | | |  
 Leu Thr His Trp Val Phe Gly Glu Val Ser Leu Val Ser Arg Trp Ala (Email)

Val Ser Gly His Pro His Pro Gly Pro Asp Pro Asn Pro Phe Gly Gly (SID #2)  
 | | | | | | | | | | | | | | | |  
 Val Ser Gly His Pro His Pro Gly Pro Asp Pro Asn Pro Phe Gly Gly (Email)

Ala Val Leu Leu Cys Leu Ala Ser Gly Leu Met Leu Pro Ser Cys Leu (SID #2)  
 | | | | | | | | | | | | | | | |  
 Ala Val Leu Leu Cys Leu Ala Ser Gly Leu Met Leu Pro Ser Cys Leu (Email)

Trp Phe Arg Gly Thr Gly Leu Ile Trp Trp Val Thr Gly Thr Ala Ser (SID #2)  
 | | | | | | | | | | | | | | | |  
 Trp Phe Arg Gly Thr Gly Leu Ile Trp Trp Val Thr Gly Thr Ala Ser (Email)

Ala Ala Gly Leu Leu Tyr Leu His Thr Trp Ala Ala Ala Val Ser Gly (SID #2)  
 | | | | | | | | | | | | | | | |  
 Ala Ala Gly Leu Leu Tyr Leu His Thr Trp Ala Ala Ala Val Ser Gly (Email)

Cys Val Phe Ala Ile Phe Thr Ala Ser Met Trp Pro Gln Thr Leu Gly (SID #2)  
 | | | | | | | | | | | | | | | |  
 Cys Val Phe Ala Ile Phe Thr Ala Ser Met Trp Pro Gln Thr Leu Gly (Email)

His Leu Ile Asn Ser Gly Thr Asn Pro Gly Lys Thr Met Thr Ile Ala (SID #2)  
 | | | | | | | | | | | | | | | |  
 His Leu Ile Asn Ser Gly Thr Asn Pro Gly Lys Thr Met Thr Ile Ala (Email)

Met Ile Phe Tyr Leu Leu Glu Ile Phe Phe Cys Ala Trp Cys Thr Ala (SID #2)  
 | | | | | | | | | | | | | | | |  
 Met Ile Phe Tyr Leu Leu Glu Ile Phe Phe Cys Ala Trp Cys Thr Ala (Email)

Phe Lys Phe Val Pro Gly Gly Val Tyr Ala Arg Glu Arg Ser Asp Val (SID #2)  
 | | | | | | | | | | | | | | | |  
 Phe Lys Phe Val Pro Gly Gly Val Tyr Ala Arg Glu Arg Ser Asp Val (Email)

**Exhibit C****A Comparison of SEQ ID NO.:2 and the Nucleotide Sequence of the Email**

Leu Leu Gly Thr Met Met Leu Ile Ile Gly Leu Asn Met Leu Phe Gly (SID #2)  
 | | | | | | | | | | | | | | | |  
 Leu Leu Gly Thr Met Met Leu Ile Ile Gly Leu Asn Met Leu Phe Gly (Email)

Pro Lys Lys Asn Leu Asp Leu Leu Leu Gln Thr Lys Asn Ser Ser (SID #2)  
 | | | | | | | | | | | | | | | |  
 Pro Lys Lys Asn Leu Asp Leu Leu Leu Gln Thr Lys Asn Ser Ser (Email)

Lys Val Leu Phe Arg Lys Ser Glu Lys Tyr Met Lys Leu Phe Leu Trp (SID #2)  
 | | | | | | | | | | | | | | | |  
 Lys Val Leu Phe Arg Lys Ser Glu Lys Tyr Met Lys Leu Phe Leu Trp (Email)

Leu Leu Val Gly Val Gly Leu Leu Gly Leu Gly Leu Arg His Lys Ala (SID #2)  
 | | | | | | | | | | | | | | | |  
 Leu Leu Val Gly Val Gly Leu Leu Gly Leu Gly Leu Arg His Lys Ala (Email)

Tyr Glu Arg Lys Leu Gly Lys Val Ala Pro Thr Lys Glu Val Ser Ala Ala (SID #2)  
 | | | | | | | | | | | | | | | |  
 Tyr Glu Arg Lys Leu Gly Lys Val Ala Pro Thr Lys Glu Val Ser Ala Ala (Email)

Ile Trp Pro Phe Arg Phe Gly Tyr Asp Asn Glu Gly Trp Ser Ser (SID #2)  
 | | | | | | | | | | | | | | | |  
 Ile Trp Pro Phe Arg Phe Gly Tyr Asp Asn Glu Gly Trp Ser Ser (Email)

Leu Glu Arg Ser Ala His Leu Leu Asn Glu Thr Gly Ala Asp Phe Ile (SID #2)  
 | | | | | | | | | | | | | | | |  
 Leu Glu Arg Ser Ala His Leu Leu Asn Glu Thr Gly Ala Asp Phe Ile (Email)

Thr Ile Leu Glu Ser Asp Ala Ser Lys Pro Tyr Met Gly Asn Asn Asp (SID #2)  
 | | | | | | | | | | | | | | | |  
 Thr Ile Leu Glu Ser Asp Ala Ser Lys Pro Tyr Met Gly Asn Asn Asp (Email)

Leu Thr Met Trp Leu Gly Glu Lys Leu Gly Phe Tyr Thr Asp Phe Gly (SID #2)  
 | | | | | | | | | | | | | | | |  
 Leu Thr Met Trp Leu Gly Glu Lys Leu Gly Phe Tyr Thr Asp Phe Gly (Email)

Pro Ser Thr Arg Tyr His Thr Trp Gly Ile Met Ala Leu Ser Arg Tyr (SID #2)  
 | | | | | | | | | | | | | | | |  
 Pro Ser Thr Arg Tyr His Thr Trp Gly Ile Met Ala Leu Ser Arg Tyr (Email)

Pro Ile Val Lys Ser Glu His His Leu Leu Pro Ser Pro Glu Gly Glu (SID #2)  
 | | | | | | | | | | | | | | | |  
 Pro Ile Val Lys Ser Glu His His Leu Leu Pro Ser Pro Glu Gly Glu (Email)

**Exhibit C****A Comparison of SEQ ID NO.:2 and the Nucleotide Sequence of the Email**

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Ile | Ala | Pro | Ala | Ile | Thr | Leu | Thr | Val | Asn | Ile | Ser | Gly | Lys | Leu | Val | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Ile | Ala | Pro | Ala | Ile | Thr | Leu | Thr | Val | Asn | Ile | Ser | Gly | Lys | Leu | Val | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Asp | Phe | Val | Val | Thr | His | Phe | Gly | Asn | His | Glu | Asp | Asp | Leu | Asp | Arg | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Asp | Phe | Val | Val | Thr | His | Phe | Gly | Asn | His | Glu | Asp | Asp | Leu | Asp | Arg | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Lys | Leu | Gln | Ala | Ile | Ala | Val | Ser | Lys | Leu | Leu | Lys | Ser | Ser | Ser | Asn | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Lys | Leu | Gln | Ala | Ile | Ala | Val | Ser | Lys | Leu | Leu | Lys | Ser | Ser | Ser | Asn | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Gln | Val | Ile | Phe | Leu | Gly | Tyr | Ile | Thr | Ser | Ala | Pro | Gly | Ser | Arg | Asp | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Gln | Val | Ile | Phe | Leu | Gly | Tyr | Ile | Thr | Ser | Ala | Pro | Gly | Ser | Arg | Asp |          |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Tyr | Leu | Gln | Leu | Thr | Glu | His | Gly | Asn | Val | Lys | Asp | Ile | Asp | Ser | Thr | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Tyr | Leu | Gln | Leu | Thr | Glu | His | Gly | Asn | Val | Lys | Asp | Ile | Asp | Ser | Thr | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Asp | His | Asp | Arg | Trp | Cys | Glu | Tyr | Ile | Met | Tyr | Arg | Gly | Leu | Ile | Arg | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Asp | His | Asp | Arg | Trp | Cys | Glu | Tyr | Ile | Met | Tyr | Arg | Gly | Leu | Ile | Arg | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Leu | Gly | Tyr | Ala | Arg | Ile | Ser | His | Ala | Glu | Leu | Ser | Asp | Ser | Glu | Ile | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Leu | Gly | Tyr | Ala | Arg | Ile | Ser | His | Ala | Glu | Leu | Ser | Asp | Ser | Glu | Ile | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Gln | Met | Ala | Lys | Phe | Arg | Ile | Pro | Asp | Asp | Pro | Thr | Asn | Tyr | Arg | Asp | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Gln | Met | Ala | Lys | Phe | Arg | Ile | Pro | Asp | Asp | Pro | Thr | Asn | Tyr | Arg | Asp | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Asn | Gln | Lys | Val | Val | Ile | Asp | His | Arg | Glu | Val | Ser | Glu | Lys | Ile | His | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Asn | Gln | Lys | Val | Val | Ile | Asp | His | Arg | Glu | Val | Ser | Glu | Lys | Ile | His | (SID #2) |

|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Phe | Asn | Pro | Arg | Phe | Gly | Ser | Tyr | Lys | Glu | Gly | His | Asn | Tyr | Glu | Asn | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Phe | Asn | Pro | Arg | Phe | Gly | Ser | Tyr | Lys | Glu | Gly | His | Asn | Tyr | Glu | Asn | (Email)  |

|     |     |     |     |     |     |     |     |     |     |     |     |     |          |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|----------|
| Asn | His | His | Phe | His | Met | Asn | Thr | Pro | Lys | Tyr | Phe | Leu | (SID #2) |
|     |     |     |     |     |     |     |     |     |     |     |     |     |          |
| Asn | His | His | Phe | His | Met | Asn | Thr | Pro | Lys | Tyr | Phe | Leu | (Email)  |